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THE CURVED LINE OF PLEURITIC EFFUSION.

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"J'espère à ce sujet vous faire voir l'utilité pratique d'un signe découvert par Damoiseau et qu'on n'a pas suffisamment utilisé, au triple point de vue du diagnostic du pronostic et du traitement."

THESE words introducing a lecture upon a case of pleuritic effusion,[1] in which the curved line was shown, are still so applicable as to warrant an additional article upon the subject.

At a meeting of the Boston Society for Medical Improvement in March, 1873, and in the JOURNAL of January 1, 1874, attention was called to the *curvature of the line which limits the flatness superiorly, in cases of effusion into the pleural cavity.*

A general statement only was made at the time, and the cases upon which the remarks were based are now presented, as they make this important point clearer.

CASE I. A colored laborer, twenty-eight years old, entered the Massachusetts General Hospital on November 11, 1872. Two months before, he had a febrile attack which confined him to the house for a month. Though able then to go about, he was not well, did not gain strength, and had some pain in the right side of the chest. The exact duration of the latter could not be ascertained, but it was not sufficiently marked to prevent a diagnosis of slow fever.

At the time of entrance he complained of a sharp darting pain in the right side of the chest, intermitting and interfering with respiration. There was no cough. Though weak he was able to sit up. Repeated examinations showed nothing but an *ill-defined dullness, occupying about the lower inch and a half of the right side of the chest, particularly beneath the axilla.*

On November 27th, sixteen days after entrance, the pain disappeared in the side and attacked the shoulder. An examination at the time showed *flatness as high as the nipple*, and extending around the chest, varying with a change of position. Bronchial respiration and œgophony were heard at the upper part of the effusion.

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[1] Peter, Gazette des Hôpitaux, No. 4, 1869.

From this time until his discharge, on January 14th, he gradually improved, and the line of dullness sank to a point an inch below the nipple. *This case is reported as the one which first attracted attention to the peculiar form of the dullness in pleurisy.* When the effusion became so marked as to be unquestionable, the fact that the dullness had been most obvious in the sub-axillary region, during the period of doubt, suggested the possibility, that the evidence of an accumulation of fluid within the pleural cavity might first be obtained in that region, and would be most distinct there even when obvious elsewhere, the superior line of dullness forming a curve. Bearing this in mind, diagrams were made of cases seen subsequently, which show very clearly the correctness of the view advanced.

Case II. On November 10, 1873, an Irish currier nineteen years old entered the Massachusetts General Hospital. Six weeks previous, after exposure to cold, he was attacked with a chill and pain in the lower part and right side of the chest. He was in bed for two weeks, and was told that he had pleurisy. He then improved, and was up and about for two weeks. There was no cough until two days before entrance, and no expectoration.

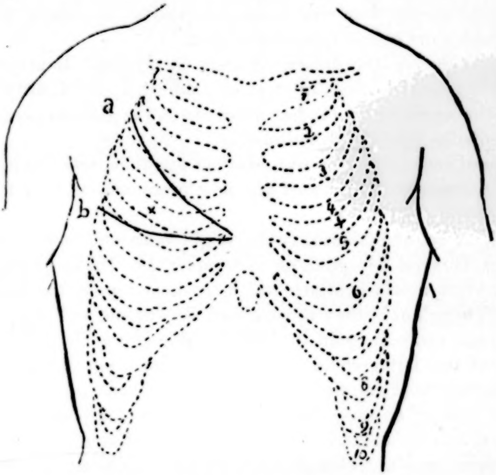

Fig. 1.—*a.* Line of November 25th. *b.* Line of December 28th.

On November 12th, two days after entrance, the pulse was 112 and of good character, and the respiration about 20, not labored. On exploration of the chest there were found flatness over the whole right side, moist râles along the spine, with bronchophony and œgophony over the lower half of the back, except along the spine. The moist râles along the spine showed that air was entering the compressed lung in that region.

On November 23d the pulse had fallen to 68. Though the flatness persisted, the respiratory murmur was heard far beyond the line of demarkation both in front and behind, gradually diminishing toward the axillary region, where it disappeared; and there was still increased resonance of voice, in comparison with the other side, but no œgophony. Though the line of dullness had not changed here, it was evident that much fluid had been absorbed, as the respiration was heard so distinctly in the upper part of the lung. On November 25th the absorption became also manifest through a change in *the line of dullness, which though not sharply limited followed the curve shown in the diagrams.* (Figures 1 and 2.)

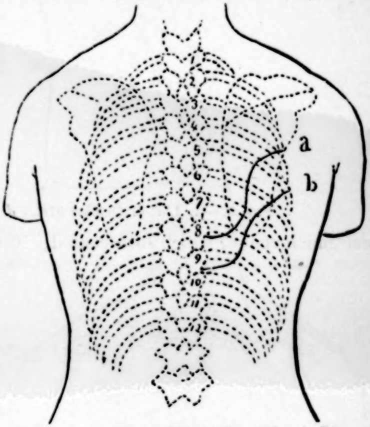

FIG. 2. — *a.* Line of November 25th. *b.* Line of December 28th.

Normal respiration was heard above and within the line. The bronchial respiration had disappeared.

On December 11th there was a slight, doubtful friction sound beneath the right scapula.

On December 28th *the curved line of dullness had changed as in the diagram.* (Figures 1 and 2, *b.*)

CASE III. On October 3 , 1873, a sailor, twenty years old, a native of the Western Islands, entered the Massachusetts General Hospital. As he did not understand English, no special history could be obtained, though it was ascertained that there was pain in the region of the right nipple, and the sputa were yellowish white, and frothy. The pulse was 130, small and weak. Temperature 103°. The whole right side of the chest was flat, except the top of the shoulder and the clavicular region. The heart was pushed to the left. (See Figures 3 and 4, *c.*) Normal respiration was heard above and slightly below the line of dullness, and soft bronchial respiration over the back, quite extensively.

On the following day he was tapped between the eighth and ninth ribs, near the lower angle of the scapula, and eighty-four ounces of clear, yellow serum were drawn off. During the latter part of the operation there

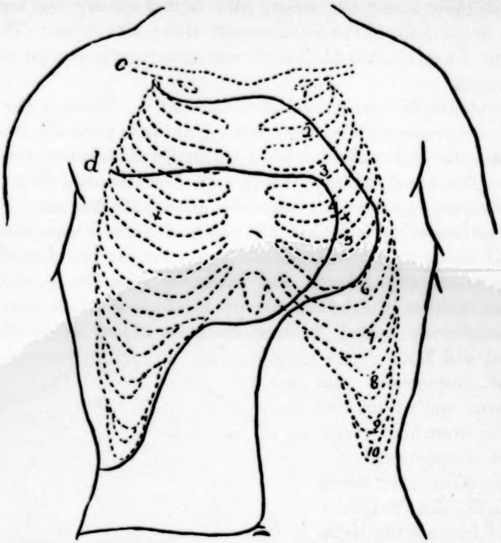

Fig. 3.—*c.* Line of October 31st. *d.* Line of November 2d.

was much cough, which soon ceased. *On November 2d the line of dullness was as shown in the diagram.* (Figures 3 and 4, *d.*) Above the line respiration was heard everywhere, accompanied by moist râles on inspiration, and sibilant and sonorous râles on inspiration and expiration.

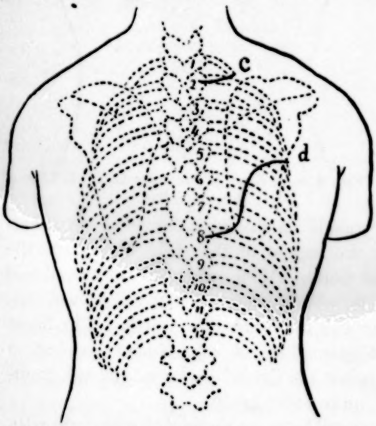

Fig. 4.—*c.* Line of October 31st. *d.* Line of November 2d.

On November 3d the dullness was the same, but the sibilant and sonorous râles had disappeared, and the mucous râles were less abundant. Normal respiration was heard to the base along the spine, and from one to two inches outwards, the area over which it was heard increasing towards the upper part, and following the line somewhat as indicated.

The patient was discharged on December 15th, having been up and dressed for about two weeks.

Case IV. The following case, though one of hydrothorax, illustrates the same point, and is therefore introduced here.

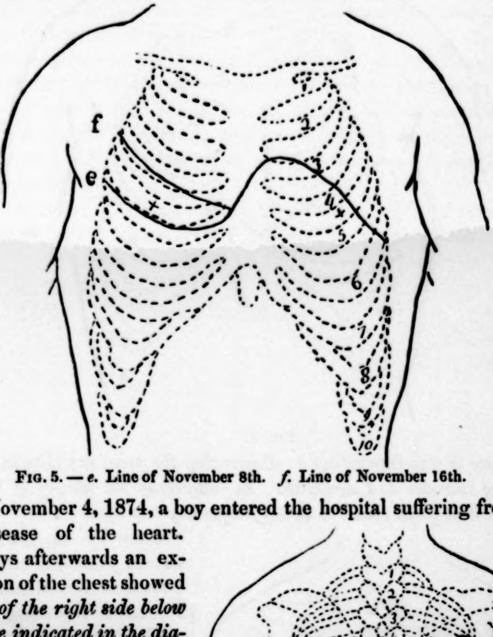

Fig. 5. — *e.* Line of November 8th. *f.* Line of November 16th.

On November 4, 1874, a boy entered the hospital suffering from valvular disease of the heart. Four days afterwards an examination of the chest showed *flatness of the right side below the line e indicated in the diagrams* (Figures 5 and 6), the curve being best marked posteriorly.

On November 16th the flatness had risen to the line *f*. Vesicular respiration was absent over a large portion of the flat region, but that of a bronchial character was heard over the lower third, commencing at the spine and gradually diminishing towards the post-axillary line, where it disappeared. There was also well-marked œgophony over this region.

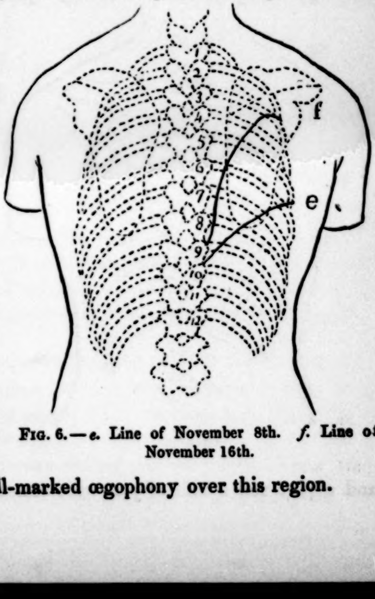

Fig. 6. — *e.* Line of November 8th. *f.* Line of November 16th.

On November 24th the line of flatness had again fallen below the line e. Respiration was heard even lower than the line, but œgophony persisted.

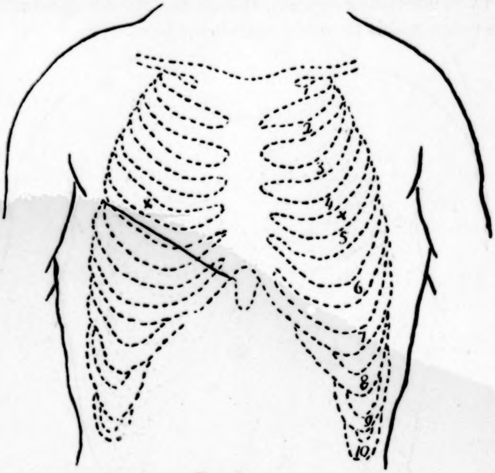

FIG. 7.

The case is also interesting as illustrating the great rapidity with which fluid may increase and diminish. In judging of the efficacy of remedies this important point seems to be too frequently lost sight of.

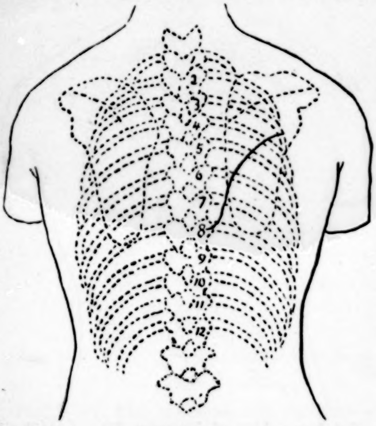

FIG. 8.

CASE V. A young man, sixteen years old, entered the service of Dr. Minot March 28, 1874, reporting that six weeks before he took cold, had a chill, began to cough, perspired at night, and was troubled by pain in the right side of the chest posteriorly, especially on taking a long breath. He had expectorated considerable "phlegm." There had been marked dyspnœa, and he had lost much flesh and strength. He was confined to his room for four weeks, and to his bed afterwards. Three weeks before entrance he was tapped, and a pint and a half of pus were drawn off. On examination after entrance *the right side was flat below the line indicated.* (Figures 7 and 8.)

As the diagnosis was proved by the withdrawal of pus through a fine trocar, it is unnecessary to give the other physical signs or speak farther of the case, as it is introduced here merely to show the curved line as drawn by an independent observer.

As the observations of Damoiseau alluded to in the previous paper, and published in the *Archives générales de Médecine*, 1843, were based upon cases in which the effusion was subsiding, and as some of the curves differ from those given, it may be interesting to reproduce his illustrations, with a brief statement of some of the valuable conclusions at which he arrived.

In five patients who were recovering from effusion he found the curves as represented in the plates. (See Figures 9 and 10, plates of Damoiseau.)

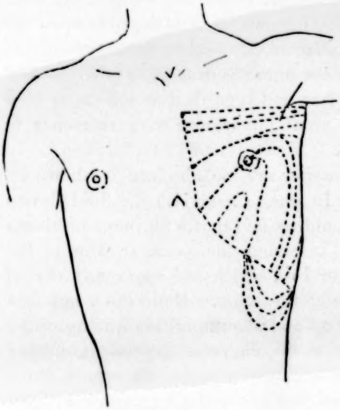

FIG. 9.

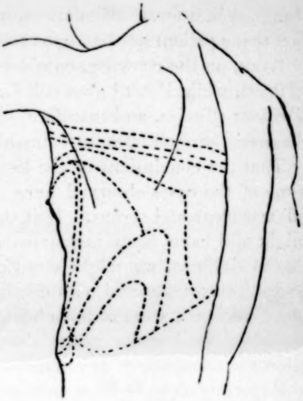

FIG. 10.

Three facts were constant: —

(1.) While the flatness persisted in the sub-axillary region on a level with and beneath the lower angle of the scapula, there was resonance in the lower part of the vertebral groove.

(2.) The flatness always disappeared last from the lowest sub-axillary region.

(3.) Whenever the absolute flatness reached a point about two and three fourths inches above the nipple, the line was nearly horizontal, but beneath this level it assumed a parabolic form, the curvature constantly increasing until it became elliptical in the lower and lateral parts of the hypochondrium.

The cases of Damoiseau, as well as those observed here, show the importance of bearing in mind the fact that *a limited effusion may be detected quite early if sought for in the lowest sub-axillary region.* Damoiseau thinks that even an ounce can be discovered, and that there can be no doubt about ascertaining the presence of two or three ounces.

But little has been written upon this subject, and this little is hidden from the majority of readers in foreign languages and in periodicals. On this account a brief statement is made of the views of such observers as have investigated it.

Wintrich[1] states that the line which marks the upper limit of the effusion forms a parabolic curve quite frequently, though he adds that it is always highest behind.

Dr. Paul Niemeyer[2] speaks of the parabolic curve of Damoiseau as what he has often found.

In a monograph by Adolph Ferber,[3] the author gives the credit to Damoiseau of first calling attention to the curve in pleurisy, but adds "that such a form of limitation, which is exceptional, depends upon the fact that a patient has lain upon the affected side early and continuously."

Aran, on the contrary, considers the curve as *diagnostic of a pleuritic effusion*, while Peter[4] goes still farther and regards it as *indicative of a fibrinous effusion*, and therefore of great importance with reference to diagnosis, prognosis, and treatment.

That the conclusions of the last writer are too absolute is shown by some of the cases observed here. In one (Case III.) the fluid drawn off was clear and serous. If it should be said that a fibrinous residuum might still have been instrumental in giving the peculiar form to the line of dullness, we might cite Case IV., which was apparently one of hydrothorax connected with disease of the heart. Both the conditions of the patients, some of them being up and about, and the quality of the contained fluid make it probable that the curve is dependent neither upon the character of the effusion nor upon the position assumed.

Experiments have been performed to explain the curvature of these lines. Damoiseau himself inflated the lungs of a dead body, and then removed the soft parts until the surface of the lung was seen in contact with the ribs. On drawing out the air with the proper apparatus, the parietal and visceral layers of the pleura were seen to separate first in the lowest part of the sub-axillary region, and then before and behind, until the line of the lower edge of the lung became nearly horizontal.

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[1] Virchow's Handbuch der speciellen Pathologie und Therapie, vol. 5, p. 254.

[2] Handbuch der theoretischen und clinischen Percussion and Auscultation. Erlangen, 1868. Page 181.

[3] Die physicalischen Symptome der Pleuritis Exsudativa. Marburg. 1875. Page 33.

[4] Valeur diagnostique, pronostique et thérapeutique des Courbes de Damoiseau. Gazette des Hôpitaux, No. 4, 1869.

In the JOURNAL for September 17, 1874, Dr. G. M. Garland describes the results of injecting a solution of plaster of Paris into the thoracic cavities of living and dead dogs. He found "that the resisting lung rather than the encroaching fluid was the chief moulding agent and factor in determining the curve of dullness." He also found "with small and medium effusions in dogs that the curve and lung were lowest behind. Then the curve rose till it reached the side, whence it proceeded nearly horizontally to the sternum."

To these results Ferber objects. While further observation and experimentation may be necessary to settle this difficult point, and to explain satisfactorily *how* the curve is formed, there can be no doubt about the fact and its value. *The cases upon which the present article is based were observed, and the lines were drawn without the knowledge that similar observations had been made previously.* In some instances the points of flatness were marked by an assistant, while the chest of the patient was covered with a towel, which made it impossible to see the relations of successive portions of the line until it was completed. *They furnish, therefore, additional proof that the sign is sufficiently clear, and one which merits much greater attention than it has hitherto received.*

UNCOMPLICATED BACKWARD DISLOCATION OF THE HEAD OF THE RADIUS.

BY HENRY A. MARTIN, M. D.,

Brevet Lieutenant-Colonel and late Staff Surgeon U. S. V.

THERE came into my office, on the 17th of June, 1876, a man of about thirty, corpulent, and evidently having paid large homage to the royalty of Gambrinus. He had received an injury of the left elbow in the following manner. He and a comrade, in that ebullition of the natural spirits which is born of beer, were having a sort of wrestling bout; my patient had his left arm round the waist of his friend; the right arm of the latter was clasped round the other's thorax; each, in this wise, facing the other, endeavored to throw his opponent; presently they fell, my patient uppermost, his arm under the back of his boon companion when it came in contact with the floor. I made the men take the positions in which they were before they fell, and, as well as I could make out, it seemed probable that the part of my patient which first struck the floor was the inner condyle of the left arm, a little behind its inner extremity, the fore-arm being at the same time forced by the descending weight of the two men into extreme supination. That there had been a violent blow on the inner condyle was evident from marked ecchymosis at that point. My attention was first attracted to this ecchymosis as probably indicating the seat of injury to the bone: but there was none.

The internal condyle, which seemed very prominent, was not fractured. On further examination it was found that the head of the radius lay behind the external condyle. Extending and supinating the fore-arm were quite painful, and the man instinctively supported the arm in a flexed position to avoid this. The character of the dislocation was very evident, and was made still more so on slight extension, and inclination of the fore-arm towards supination. Notwithstanding the fatness of the patient, the button-like head of the radius, and even the depression on its surface, could be perfectly defined. The arm was flexed to nearly a right angle, extension and counter-extension were moderately applied, and, by pressure with my right thumb on the head of the radius, it was easily replaced, but would tend to slip out on the slightest motion of the fore-arm towards supination; once, while I was preparing splints, it *did* slip out while the arm was flexed, but was replaced with very little effort. Pieces of prepared felt [1] of proper shape were dipped in hot water, and applied to each side of the elbow so as to retain the joint at about ten degrees less than a right angle; over this a bandage was snugly wound. The arm was examined in thirty-eight hours; very slight and careful rotation of the fore-arm failed to develop any tendency to displacement; pain and swelling were very much diminished; again in three days there was no stiffness or abnormal limit to motion of the radial joint, and but trifling pain. In three days more there was perfect motion of the elbow, except that extension was somewhat limited. Splints and bandage were not re-applied, but the patient was strictly admonished not to use the arm except for prescribed motion, to carry it in a sling for ten days, after which time for one month to avoid hard use of the arm, and, above all things, for all future time to shun Græco-Roman exercises in connection with Teutonic beverages. I saw him six weeks after this; he had returned to work, and was not aware of any abnormal condition of the arm whatever, but there was still an incapacity to extend the arm to the same degree to which the other arm could be extended.

In view of the extreme rarity of backward dislocation of the head of the radius when uncomplicated with other injury, particularly fracture of the inner condyle, I was slow to conclude that this was such a case, and made the most careful survey and examination, which were repeated at the second visit. Without any doubt whatever, the case was one of this rare form of luxation, complicated with no other displacement or injury of joint or bone. The great infrequency of the dislocation is reason enough for recording this instance of it. Sir Astley Cooper, with his immense experience, never saw a case in the living subject, but describes and figures an unreduced dislocation in a dissecting-room *cadaver*,[1] which may possibly not have been primarily an uncomplicated case. Druitt alludes to its great rarity. Hamilton counts up twenty-eight cases from all surgical literature; four of them were from his own observation, and three were reported by Dr. Markoe, of New York. Dr. Hamilton says, however, that two of his own cases were accompanied with fracture, and that he was not certain but that they all were, and Dr. Markoe "found in each" of his cases a fracture of the internal condyle of the humerus, and after an examination of a number of the reported cases, he does not find any evidence that this dislocation ever occurs as a simple uncomplicated accident. Commenting upon this Hamilton says: "While I am prepared to admit the possibility of the luxation without a fracture either of the lower end of the humerus or of the ulna, I have found no written account of any case, nor have I seen an example which was absolutely conclusive."[2] Fully aware of all this weight of authority, I examined my case repeatedly with the most exact and thorough care. The skin was very loose over the condyle, the form of the latter could be most fully and exactly made out, and its entire freedom from lesion could be ascertained. The abnormal bagginess of skin over the internal condyle disappeared when the displaced bone was reduced. The induration and ecchymotic discoloration over the internal condyle, observed eight days after the accident, and even later, evinced clearly enough how violent had been the contusion at that point. That the condyle escaped fracture was remarkable, but that it *did* escape admits of no doubt. Why this bony process is so generally fractured in those cases in which the head of the radius is luxated backwards, is not clearly demonstrated by any of the numerous writers I have looked into. Hamilton says, under the head of "Causes," "a direct blow upon the front and upper part of the radius; a fall upon the elbow, or upon the hand; a violent effort to supine the fore-arm while it is grasped and held firmly in a state of pronation; probably, also, sometimes it is occasioned by a twisting of the arm in machinery."[3] One or two of these causes might account for fracture of the inner condyle, and the rest for dislocation of the radius, but none of them for dislocation of the radius backwards, *with* fracture of, or contusion over the internal condyle. Is it not probable that, in all cases in which these two lesions are found, the patient receives a violent blow upon the inner aspect of the condyle while the fore-arm is in extreme supination, as was almost certainly the case with my beery client, though he, having a humerus harder than his head, escaped the fracture?

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[1] I have long known "prepared hatter's felt" by its being mentioned in works and cases of surgery, but have never been able to find it at any of our instrument or splint makers. Within a few months I have found a sort of felt, *not* "hatter's," but much thicker than that, which, saturated with an alcoholic solution of shellac, forms a *material* for certain splints, used as above indicated, that leaves nothing to be desired. I have given Messrs. Leach & Greene a sample, and informed them where and how to get the felt and have it prepared.

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[1] Sir Astley Cooper. A Treatise on Dislocations and Fractures of the Joints. London. 1842. Page 459 et seq.

[2] Hamilton. Fractures and Dislocations, etc. Philadelphia. 1860. Page 576.

[3] Hamilton. Op. cit., page 576.

RECENT PROGRESS IN DERMATOLOGY.[1]

BY JAMES C. WHITE, M. D.

THE first two of the contributions mentioned below,[2] by Professor Kaposi, of Vienna, have appeared as separate articles during the past summer; they form a part, however, of the concluding portion of the general publication announced under the third title. This extensive work, the first part of which appeared in 1860, and in the Sydenham translation in 1866, is at last finished, and forms the most valuable treatise on skin diseases ever published. The earlier parts were mainly the work of Professor Hebra, and contain the results of his immense experience and acute observation; the latter portions are mostly, and this last volume wholly, prepared by Professor Kaposi, his assistant. The latter part is an exhaustive treatise upon the last three of Hebra's twelve classes of diseases, the Ulcera cutanea, Neuroses, and Dermatoses parasitariæ. Since the publication of the earliest part, a period of sixteen years, there have been important additions to our methods of study in dermatology, and a clearer insight into the nature of the anatomical and pathological conditions that underlie those surface appearances which formerly sufficed for all purposes of diagnosis and classification; and no one is better fitted than Professor Kaposi to apply these methods to the investigation of the obscure affections which largely make up the concluding volume. The first half has also been revised and republished by Hebra within two or three years, so that the complete work represents to-day not only the latest and deepest studies in the science, but in fullest detail the practice also, of dermatology.

Cutaneous ulcers are divided, by Kaposi, into those resulting from circumscribed or diffused inflammation, and those which are the result of new growths, as lupus, leprosy, carcinoma, and syphilis.

Under neuroses, he defines such pathological conditions of the skin as are the result of its abnormal or disturbed innervation, without the occurrence of any pathological change that can be demonstrated by the present methods of examination in the cutaneous nerves. This is a narrow definition, quite out of keeping with the modern fashion of making nearly every disease of the skin a neurosis, but very characteristic of that sensible feature of the Vienna school, the refusal to recognize the imagination as the equivalent of scientific demonstration for the basis of its doctrines. Under neuroses, therefore, we find only disturbances of the sensibility of the skin included, anæsthesia, hyperæsthesia, and pruritus.

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[1] Concluded from page 674.

[2] Cutaneous Ulcers (Ueber Hautgeschwüre). Kaposi. Wiener Klinik. II Jahrgang, 5 and 6 Heft. May, 1876.

The Present State of our Knowledge respecting the Vegetable Parasites of the Skin. Kaposi. Stricker's Jahrbücher. Heft iv. 1876.

Lehrbuch der Hautkrankheiten. Von Dr. Ferdinand Hebra und Dr. Moriz Kaposi. Zweiter Band. Dritte Lieferung. Virchow's Handbuch der speciellen Pathol. und Ther. III Band. II Abt.

The introductory chapter on the vegetable parasites above referred to is a very interesting *résumé* of our present knowledge of the mycology of the affections to which they give rise. It is not surprising, however, that the author leaves the subject in the same state of obscurity in which he found it, and confesses that we really know nothing of the botanical relations of the parasitic fungi of the human skin. He recognizes only three well-established forms of disease, tinea tonsurans, tinea favosa, and tinea versicolor, throwing out alopecia areata from the list. It is a pleasure to announce that Kaposi relinquishes the opinion, so long maintained by Hebra, as to the identity of the parasites in the first two affections, and admits squarely that the fungi are not the same botanically, and that herpes tonsurans and favus are clinically entirely distinct pathological processes. He also recognizes the existence of parasitic sycosis.

Under animal parasites, he gives figures of the itch insect, although the disease is described at length by Hebra in the first part of the work, and of the various other human epizoa.

Tinea favosa and Tinea tonsurans. — M. Horand communicates[1] his observations upon these parasitic affections, which, although not new, are interesting as confirming the results of other observers. Favus seems to be a much more common disease in France than with us, especially among children, upon whom he has treated it in four hundred and seventy-two cases. He calls attention to its strong resemblance to ringworm when seated upon the general surface, to the infrequency with which the nails are affected, and to its frequent presence upon the rat and cat as causes of contagion, into both of which animals it may be inoculated with ease. He notices, too, its rarer occurrence in cities than in the country. Epilation he regards as the essential, indispensable element of treatment, and parasiticides as of comparatively little importance. With regard to the plant of tinea tonsurans, he found that it occurs commonly upon the cow, dog, and horse, less frequently upon the cat, but that upon the rat it cannot be inoculated. This latter fact, with the results of his experiments upon the simultaneous inoculation of favus and ringworm matter upon the same subject, convinced him of the non-identity of the fungus in these affections, and he expresses the conviction that the transplanting of favus matter upon a patch of tinea tonsurans will destroy the growth of the latter by appropriating its nutriment. Attempts to inoculate aspergillus glaucus and penicillium glaucum upon animals failed, and these moulds have, in the author's opinion, no connection with these affections. Tinea tonsurans of the scalp he considers even more difficult to cure than favus, inasmuch as epilation can be less perfectly performed on account of the more fragile condition of the hairs. Tincture of iodine, turbith mineral, and calomel he regards as the best parasiticides.

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[1] Extrait du Discours d'Installation. Annales de Dermatologie et de Syphiligraphie, tome vii., No. 4.

Alopecia areata. — Dr. Anton Nyström[1] of Stockholm finds in this affection the spores of a fungus almost constantly present, not in the hairs, nor in their roots, but upon them exterior to the follicles, upon the surrounding epidermal scales, and very lightly adherent to them. These spores he believes to be only accidentally present, and to be derived from the bandages which are worn over the heads of the patients. He undertook certain experiments to discover the nature of this fungus *des serviettes*, but the culture was not conducted in a manner to warrant any conclusions from the result (penicillium) obtained. Nyström regards the disease as not really parasitic, but as a fault of nutrition.

Filiariose: an Affection produced by a new Kind of Cutaneous Parasite. — Dr. da Silva Aranjo describes,[2] in a memoir with the above title, a new parasitic disease of the skin in Brazil, produced by a nematoid worm, which he calls filaria dermathemica. The animal is filiform, 0.25m. in length, and of an opaque white color. The egg of the worm penetrates the glandular openings of the skin, and, acting as a foreign body, produces the inflammation characteristic of the disease. The eruption is papular and vesicular, but never pustular, and is accompanied by intense itching, which is increased on exposure of the skin to the air. By scratching, the parasite and its eggs are transferred to other parts of the surface, and thus the disease becomes general. The worm always remains, when undisturbed, in the vesicle, from which it is easily extracted. The disease may be cured by the local use of carbolic acid.

The Use and Value of Arsenic in the Treatment of Diseases of the Skin. — Dr. L. D. Bulkley, of New York, presents in an essay,[3] which was read before the American Medical Association at its last meeting, his latest views upon the rational use of arsenic in the treatment of skin diseases. Its physiological action, in his opinion, is exercised primarily through the nervous system upon the vascular and cutaneous tissues; and its therapeutic value is in virtue of its "neurotonic" properties principally, but also as a "modifier of cutaneous nutrition."

Arsenic in the treatment of skin diseases has been long on trial, and has probably been employed for a generation more universally than all other remedies combined. It has had most injudicious friends, — those who have claimed for it infallible powers against nearly every functional and organic disease which the complex tissues of the skin present. There have been others, however, who have awarded it a very limited sphere of activity in this field, prominent among whom are some of the most eminent dermatologists and experienced observers, whose caution has led them, without prejudice, to deny it any action which they have not seen to follow directly from its use. The discussion of its real value at this time should be based upon data of fresh and positive character; and dermatologists will hardly be willing to accept again in evidence the opinions of former writers, whose wholesale commendations of the drug have established for them a character of unreliability as scientific witnesses upon the subject, nor statements openly based upon undemonstrated theories of its physiological action. Nothing but the results of positive and repeated observation of its independent action, from reliable and intelligent practitioners will satisfy them as the basis of a new verdict as to its merits. They will not receive as of scientific value from any source such inferences as these: Arsenic is said to improve the natural condition of the skin in healthy men and horses, therefore it should be of service in diseases of the skin; arsenic is given with benefit in some general affections exhibiting a periodic type, therefore it should do or does good in cutaneous affections marked by exacerbations in some of their subjective symptoms; arsenic has been found to be beneficial in the treatment of neuralgia and other neuroses, therefore it must be of benefit in skin diseases which are supposed to be neurotic in character; arsenic is serviceable in rheumatism, therefore in eruptions which are supposed by some to be arthritic, it ought to do good. Nor can we judge of the effect of this or of any drug when given internally, if at the same time other remedies of known or unknown efficacy are used externally upon the skin. It is by such unwarranted and loose methods of inference and experimentation that a large part of the present uncertainty in therapeutics, general and special, is due. It is to be regretted that the author of this essay has openly based his judgment in part " on what is known of its physiological action, and of the nature of the affections to be treated," because these are both largely matters of pure conjecture. Better the most empirical treatment, if its results are intelligently observed and accurately recorded.

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[1] Annales de Dermatologie et de Syphiligraphie, tome vii., No. 6.

[2] Revue des Sciences médicales, tome viii., 1st fasciculus.

[3] New York Medical Journal, August, 1876.

To the author's conclusions, therefore, so far as they rest upon inferences of the above character, we must object, as determining anything reliable or definite as to the use of arsenic in skin diseases. On the other hand, what he gives us as the results of his clinical observation simply in individual diseases is of great value, and makes the paper an important contribution to the therapeutics of dermatology.

Of the action of arsenic in psoriasis he says: In very young subjects, of ten or twelve years or under, the disease is comparatively curable, and arsenic should always be given fearlessly, and with very good probability of effecting a permanent removal of the disease. Recent attacks for the first time in older persons may be treated with very encouraging prospects of success, but the remedy should be long and steadily continued. In those who have had the eruption for many years, and have received little or no treatment, arsenic will accomplish the cure in many instances, although the previous irregular use of the remedy diminishes very considerably the chances of success. He advises that it should not only be administered until the eruption entirely disappears, but it should be continued for a period thereafter, varying in proportion to the length of time the disease has previously existed, for months rather than days or weeks. In reply to his own question, "Can arsenic ever cure psoriasis?" he answers directly, "Most emphatically it can;" and yet on a subsequent page he says, "I think I have never seen a case cured by arsenic alone." Whether psoriasis can ever be cured permanently by any one drug or by several combined, used either internally or locally, or in both ways simultaneously, is a question which is from the nature of the disease perhaps impossible of definite answer; but this much may be said, that as permanent relief from its reappearance has followed "cure" by external treatment alone as by arsenic. Yet arsenic is a very useful remedy in the disease.

With regard to its employment in eczema Dr. Bulkley is of the opinion that it is most beneficial in "nervous" cases; in those where there is "an arthritic history, past or present, in patient or family;" and in those where there is "more or less of a malarial element." Eczema of the first sort he defines as that in which the "eruption has a decidedly nervous type, that is, it itches fearfully." How to distinguish this kind of itching from that which is the most constant symptom of the affection in nearly every case we are not informed; nor is any closer definition given for distinguishing cases of the second variety; and the uncertainty of the author's mind concerning the third may be inferred from his question in this connection, whether "the augmented itching of eczema at certain periods may not indicate something of a malarial origin?" These certainly are novel propositions, but until they are presented upon a more scientific and less fanciful basis, it will hardly do to base the action of arsenic in eczema upon them. There is no doubt, however, that it is of occasional service in chronic forms of the disease, to be tested empirically, and the author's observations here are chiefly valuable as showing how tolerant of the drug are young children.

In pemphigus, Dr. Bulkley states that his experience corroborates the favorable opinion held by Mr. Hutchinson concerning the action of arsenic, one of the three cases in which he had tried it having its progress arrested in twenty-four hours.

In acne, too, Dr. Bulkley is sure that he has seen good results follow its use, and even in acne rosacea he has seen real hypertrophy of tissue diminish a third in size under its administration, when combined with local treatment. In urticaria, sycosis, the vegetable parasites, and even in warts, he is inclined to believe that arsenic is of service directly or indirectly, but the evidence presented for such confidence in its powers seems not at all sufficient to the dermatologist, who has seen its inefficiency so thoroughly demonstrated in so large a proportion of the cases he is called upon to treat.

The author further discusses, at considerable length, the physiological and toxicological action of arsenic, and its various preparations which are used in medicine. In addition to the common Fowler's solution and the Asiatic pills he uses Dr. Valangin's solution, or the liquor arsenici chloridi, an officinal preparation, and considers it "in some respects the best form in which to introduce arsenic into the system." The choice between these remedies he does not regard as an indifferent matter, and would attribute to the base or acid with which the arsenic is combined a not unimportant share in the treatment of a case, according as the system at large demands an acid, or potash, soda, or ammonia. But, certainly, unless we are prepared to accept the Hahnemann doctrine of infinitesimal potencies, the minute quantity of potash contained in the few minims of Fowler's solution daily administered must be a matter of complete indifference to the system at large or its cutaneous envelope. Here, too, we should prefer to see the opinions of the author based upon real experiments made to test the relative merits of the different preparations. As it is, he fails to demonstrate that one form differs from another, so far as their action upon the skin is concerned.

In conclusion, he presents fifteen propositions embracing the substance of his essay in a condensed form, one of which we append. "Arsenic is certainly valuable in psoriasis, eczema, pemphigus, acne, and lichen, in proper cases and when due regard is paid to the secretory organs, and to diet and other elements of general health; of less certain value in lupus, ichthyosis, sycosis, verruca, and epitheliomatous and cancerous diseases; it is absolutely useless or harmful in the syphilodermata, the animal and vegetable parasitic diseases (except in rare cases), in elephantiasis Græcorum and Arabum, in purpura, true prurigo, herpes zoster, scleroderma, molluscum contagiosum and fibrosum, keloid, vitiligo, nævus, etc."

PROCEEDINGS OF THE BOSTON SOCIETY FOR MEDICAL IMPROVEMENT.

F. B. GREENOUGH, M. D., SECRETARY.

OCTOBER 23, 1876. *Double Monstrosity.* — DR. JACKSON reported the case, and exhibited the skeleton and organs. It occurred in the practice of Dr. Joseph Murphy, of Taunton. Labor at the eighth month. Child died during the delivery; weight three pounds, four and a half ounces, and length thirteen and one half inches. There were two heads, broadly connected by integument; and, centrally, a malformed ear or ears; otherwise, two perfect faces; trunk single in front, but posteriorly broader, and two spines were felt. The four extremities were well formed.

The two heads were united by fibrous tissue firmly, but to a small extent, just behind the membrane of the tympanum. The central ribs of the two subjects were intimately fused upon the median line; and, instead of being directed forwards and downwards, as usual, they were directed backwards and downwards, and in form very strongly suggested that of the spinous processes of the adult vertebræ. This formation extended from the fourth to the eleventh pair of ribs; the longest pair, midway, being half an inch in length, and those above and below gradually shortening. The central scapulæ were represented by a minute bit of cartilage.

Just below the double pharynx there was a fusion, and the œsophagus was single and large. There were two hyoid bones, but the thyroid cartilages were fused; and the trachea, throughout its whole length, formed a common canal with the œsophagus. The heart was single, with two pairs of lungs. Unfortunately, very few records were taken at the time of the dissection; but on inquiry of Dr. Murphy, he states, very positively, that there were external female genital organs. The other abdominal organs were not remarkable, so far as a hasty examination showed.

NOVEMBER 13, 1876. *Monstrosity.* — DR. JACKSON reported the case and showed the malformed extremities and internal organs. It occurred in the practice of Dr. D. Choate, of Salem. Labor at about the end of the eighth month. A male child, well formed and living was first born, and the monstrosity followed at once, presenting by the foot. Weight of this last two pounds, eight and one half ounces, and length fifteen and one half inches. Left lower extremity wanting, and its place indicated by a small cutaneous excrescence only. The right was five inches in length and well formed, excepting the foot; there being varus and but four toes, with a broad and deep deficiency between the third and fifth. The left upper extremity was three inches in length; there were two fingers only, but these were well formed. The right was three and one half inches in length; hand bent sharply upon the fore-arm, and, though the four fingers were well developed, there was no thumb. Otherwise the subject was not remarkable externally, excepting for the absence of genital organs and of an anus, and a moderate enlargement of the head that was probably due to hydrocephalus.

The prepared extremities show an absence of the fourth metatarsal bone as well as of the toe; absence of the radius on each side, the ulna and the right humerus being well developed. The left humerus seems to be well developed, inferiorly, to the extent of about three fourths of an inch; and superiorly a small mass of cartilage is felt connected with the scapula, but between these two portions of the bone there is nothing except muscle. The fingers and toes, with the carpus and tarsus, are well formed so far as they are developed, excepting in the left hand, in which the first phalanx of one of the fingers is broad, and has two metacarpal bones connected with it. The right side of the pelvis is well developed, but the ischium is bent over to the left side and unites, by fibrous tissue, with the left os innominatum. This last is small and irregularly formed, and the ischium is wanting. On the left side the laminæ of the sacral vertebræ form a confused mass of some size.

The internal organs were very unusually malformed. The larynx appeared quite normal at its entrance, but within it ended in a cul-de-sac, and of the trachea there was not a trace to be seen. The lungs were fully developed, but the right was formed of one lobe only, and the left was only partially divided. It is greatly to be regretted that the thoracic organs were necessarily hastily removed, and under very unfavorable circumstances; and some very important points, consequently, were not ascertained. The œsophagus, particularly, which was of full size, was cut off just above the diaphragm, but no trace of a stomach could be found either above or below this last, at the time or on the following day. The heart sent off an aorta and a pulmonary artery from the right ventricle; and the first of these two vessels was the farthest to the right. The opening from the right ventricle into the left was of moderate size. The ductus arteriosus was quite long and slender. In the abdomen there was found a pretty fully developed liver, two renal capsules, a piece of intestine four and one half inches long and one sixth of an inch in diameter, terminating bluntly at each extremity in a cul-de-sac, and filled apparently with secretions. There were also two organs that, to the naked eye and microscopically, seemed as if they might be testicles. These were all of the organs.

Myxo-Sarcoma of the Uterus. — DR. HODGES reported the case. The patient, a woman aged fifty-three, was troubled with pain about six months ago; two months afterwards a tumor was partially removed from the vagina, and four weeks after that she was etherized and it was thoroughly removed. In four weeks a tumor had re-formed in the vagina, as large as a fœtal head. It was soft, elastic, and covered with a thin membrane, which, during examination, broke down easily, causing a profuse hæmorrhage, which left the patient in a state of collapse and almost pulseless. She rallied, however, under stimulants. A large gelatinous mass, filling the vagina, was broken down with the fingers and removed, a spoon being used to scoop it out.

This mass extended up into the uterus as far as the hand reached; in fact the whole cavity of the uterus seemed to be filled by this material. This operation was performed on May 9th; on May 16th she was pretty well, with a temperature of 100°, and pulse 115. Her mental condition was, however, rather peculiar. On June 4th she had a severe chill, and died June 7th. There was at no time marked abdominal tenderness. At the autopsy, made by Dr. Fitz, the tumor was found to have recurred to a considerable extent. **Dr. Fitz** showed the specimen and reported as follows: —

The uterus is enlarged to a size corresponding with that of the third month of pregnancy. From the os externum, which was large and patulous, there protruded a dry, yellow, membranous substance. The enlargement of the uterus was found to be chiefly due to a dilatation of its cavity, though its walls were moderately thickened. The greater portion of the inner surface of the uterus is covered with a soft, pale yellow tissue, translucent in spots, which projects slightly, and presents an everted fungus-like border near the fundus. The lower border, about a half inch from the os, is tolerably sharply defined. The growth extends into the muscular substance of the uterus as an opaque, white, firm infiltration, with an irregular margin near the os internum. The new formation is composed chiefly of small, round, and large spindle-cell tissue, with but little intercellular substance. The more translucent portions consist of round, spindle, and stellate cells, all small and separated from each other by a moderate amount of homogeneous, transparent, intercellular substance, in which are a few delicate fibrils, and which presents the reaction of mucine.

Within the wall of the uterus, above and removed from the sarcoma, were a few small collections of pus, which were continued outwards into the broad ligament as longitudinal purulent collections, apparently within communicating and anastomosing cavities lined with a smooth wall, probably lymph vessels. An abscess of considerable size had formed in this broad ligament, which was adherent to the pelvic walls, and the peritoneal surface of the uterus bore a few patches of recent false membrane. The cause of death seems to have been the extension of the disease into the lymphatics.

Three or four cases of this disease, that is, myxo-sarcoma of the uterus, have been reported in Boston during the last four or five years, but the total number of reported cases is small, as it is only recently that it has been recognized, previously having been looked upon as cancer. This form of disease of the uterus starts from the mucous membrane.

Fibro-Sarcoma of the Leg. — **Dr. Beach** showed the specimen and reported the case, which had been under the care of Dr. Cabot, by whom the leg was amputated above the knee joint.

The patient, Sarah L., sixty years old, received a slight injury to the leg just below the patella, four years ago. Six months after she noticed a slight swelling at the seat of her former injury. This slowly increased until one year ago it was the size of an egg. Since then it has grown rapidly, and now extends from just below the patella to the middle of the tibia, measuring nineteen inches in circumference and eleven in longitude. Pain at times has been very severe; she has been able to walk perfectly well until within a year.

Dr. Fitz gave the following report of the tumor: —

The tumor is lobulated, of the size of a small child's head, and is intimately connected with muscle and aponeurosis, apparently arising from the latter. The lobules vary in size from that of a bean to that of a hen's egg, some being soft on palpation though hard on firm pressure, and others possessing the density of cartilage. On compression of the softer masses there was the feeling as if small nodules were present in their interior. The larger lobules could be separated from the fibrous septa surrounding them, while many of the smaller ones seemed to be imbedded in a gray, homogeneous tissue.

On section the softer nodules were composed of a gray, somewhat translucent tissue, while the denser forms presented a white, fibrous appearance. After exposure to the air the color of both assumed a slightly reddish tinge. In certain parts of the specimen yellow patches and red specks indicated fatty degeneration and hæmorrhages. The tumor as a whole contained scarcely any blood-vessels visible to the naked eye. The structure of the gray portions was abundantly cellular, the cells being of a predominant fusiform character. The nuclei were oval, homogeneous, with two nucleoli, as a rule one at each end; many of the nuclei were found free. The protoplasm, finely granular, was relatively slight in quantity. The cells were separated by a fibrous intercellular substance. The latter predominated in the denser nodules, the cells being recognized with difficulty. The addition of acetic acid showed them to be sparsely scattered among the fibres. The arrangement of both was fasciculate. In no part of the tumor could a structure resembling that of a lymphatic gland be found, though the gross appearance bore a strong resemblance to that of a lympho-sarcoma.

Nasal Medullary Sarcoma. — This case also was under the care of Dr. Cabot, and was reported by DR. BEACH.

The patient, a sailor, aged forty-five, was admitted to the Massachusetts General Hospital October 7th. Three years ago the right side of his nose became occluded, and that side was somewhat larger than the other externally. For a year and a half he had no trouble except the inconvenience of the occlusion and the swelling. At that time he began to have attacks of epistaxis, coming on usually every day or two, though at times the intervals were longer, sometimes several weeks passing without any bleeding. He has been treated by several physicians, and says that several times a friable subtance has been removed from his nostrils with forceps, but never any pieces of bone. The swelling of the right side had increased very slowly up to six weeks ago, when it was not very noticeable, but at that time he took a severe cold, and the nose swelled to its present size. At the time of entrance the nose was much swollen, very red and tender, the swelling being more marked on the right side. The right eye was closed. The patient complained of considerable pain in the nose and forehead. On examination, the posterior nares were found to be clear. Cold water dressings were applied, and a weak solution of chlorate of potash was ordered to be used in a nasal douche.

On October 24th the swelling and inflammation had subsided in a marked degree, and there was little or no pain. The patient was examined by Drs. Knight and Wadsworth, who reported, the former that the posterior nares were perfectly free; that anteriorly on the right side there was a polypus, apparently of the ordinary fibro-mucous kind, and the latter that there was sloughing of the cornea of the right eye.

On November 4th Dr. Cabot operated. Tracheotomy was performed, and a tube was inserted. A large sponge was placed above the velum palati, so as to plug the posterior nares. An incision was made, following the contour of the nose, the arch being carried somewhat above the commissure of the eyebrows, and extending on the right side nearly down to the ala, on the left not quite so low. This incision took off a slice of the upper part of the tumor, it having invaded the subcutaneous cellular tissue. The nasal bones were sawn through, and the flap was turned down over the mouth. The upper portion of the nasal bones was then removed from the frontal processes by the gouge and mallet, and the lateral attachments were severed by curved scissors. The mass was then removed. Sponges with strings fastened to them were put under the flap to provide against hæmorrhage, the strings being brought out of the nostrils. The flap was brought into place and united with sutures. The wound was dressed with a carbolic acid solution, one to forty. The sponges were pulled out through the nostrils the next day, the flap united by first intention all the way round; the tracheal wound did well, and on November 10th, the sixth day after the operation, the patient is reported as being up and feeling about as well as before the operation.

Dr. Fitz described the tumor as follows: The tumor is a medullary sarcoma. The cells were of varying shapes, mainly fusiform, some with projecting arms, and others more or less rounded. They were in general flat and rather scale-like. The intercellular substance was partly homogeneous and partly fibrillated.

DEIRDRÈ.[1]

We take pleasure in acknowledging the receipt of this poem, which has lately appeared in the No Name Series of original American novels and tales. Though its authorship is anonymous, we understand that it comes from the pen of a member of the medical profession, Dr. R. B. Joyce. The scene is laid in the north of Ireland, in times far remote, and the many favorable notices regarding the plot and composition of the poem which have appeared elsewhere, to which we must refer our readers, are highly flattering to its accomplished author.

THE CREMATION OF BARON PALM.

The ceremony which took place last week at Washington, Pa., has excited much interest, and is no doubt regarded by many as an occurrence of great importance. Baron Palm, a native of Augsburg, died last May, in New York, at the age of sixty-seven. His body was immediately embalmed and placed in the receiving vault of the Lutheran cemetery, where it remained till just before the time for cremation, awaiting the completion of the building for that purpose. This was built on the side of an elevation known as "Gallows Hill," a mile and a half to the south of Washington. It is a very simple brick building, one story high, and measuring only thirty by twenty feet. Its erection, including the construction of the furnace, retort, etc., cost about sixteen hundred dollars. Situated in the midst of beautiful natural scenery, it seemed as though everything that was possible had been done to render the spot attractive. The building was divided into two chambers, the first a reception-room, which was neatly fitted up with a light table or catafalque and a "columbarium." This latter is designed for the reception of the urns containing the ashes of cremation until called for by the friends of the deceased, and in appearance very much resembles a book-case. The second apartment is the crematory, in one corner of which is the furnace. This latter is built of brick, and measures ten feet in length, six feet in width, and six feet in height. Within the furnace is a fire-clay retort of a semi-cylindrical shape, measuring seven feet in length, twenty-four inches in width, and twenty inches in height. The furnace is so constructed that the flames pass under the retort, back of it, and forward over the top to the front, where the vapors and gases from the body mingled with them, and thence back again to the rear by means of separate flues, which there unite to enter the chimney. There is a small hole in the door of the retort for the admission of air, and through this opening the various stages of the process can easily be observed.

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[1] *Deirdrè.* No Name Series. Boston: Roberts Brothers. 1876.

The ceremony was fixed for the 6th of December, and on that day a number of physicians and others interested in sanitary matters assembled to witness the process. About thirty invitations had been issued, and many of the prominent boards of health were represented, as were also a large number of leading newspapers of this country and also of Germany, France, and England. The fires had been started at two o'clock in the morning. On opening the casket it was found that the weight of the body had been reduced from one hundred and seventy-five to ninety-two pounds. At twenty-seven minutes past eight o'clock, everything being pronounced ready, the body, lying in the iron cradle and covered with a shroud (which had been previously soaked in alum to prevent its too rapid ignition), and decorated with flowers and evergreen, was placed in the furnace. It is a matter of regret that, as there was no pyrometer at hand, there was no way of ascertaining the exact heat of the retort. In about fifteen minutes the aqueous vapor had all been expelled, leaving the shroud completely charred, but still retaining its form sufficiently to completely conceal the outlines of the body. In an hour the outlines of the prominent bones were plainly visible, and an hour later the incineration was complete, but it was deemed advisable to continue the heat for four hours from the time the body had been first placed in the furnace. During the burning the ordinary draft of the furnace was increased by means of a fan-blower. The body was not removed from the furnace until some twenty-four hours had elapsed, to allow the retort to cool. During the entire process there was no offensive odor, either at the top of the chimney or elsewhere.

The residue left, after the incineration was completed, was three pints of ashes which were carefully collected and, after being sprinkled with perfume, were deposited in an antique vase, which is to be taken to New York by members of the Theosophical Society, and deposited by them in their temple in that city.

The whole experiment consumed fifty bushels of coke worth four cents a bushel. The actual time occupied in cremating the body was two hours and twenty-seven minutes.

It may not be here out of place to state that by the use of the Siemens' furnace the expense of time and money would have been considerably lessened.

His furnace is built on the principle of regenerative heat. Its construction costs about six hundred dollars less than that of Dr. LeMoyne, and it will incinerate a body of two hundred pounds' weight in less than one hour, and at an expense of only seventy-five cents for fuel. The wife of Sir Charles Dilke was reduced to ashes in a furnace of this description at Dresden, in 1874.

In the afternoon a meeting was held at Washington, presided over by J. Lawson Judson, Esq., at which addresses were made by Colonel Olcott on the history of cremation; Rev. George P. Hayes (President of the Washington and Jefferson College) on the bearing of the Bible and Christianity upon the subject of cremation; Dr. James King on cremation viewed from a sanitary stand-point;" Dr. LeMoyne on the general advantages of cremation; Boyd Crumine, Esq., who spoke of the popular prejudices against this method of disposing of the dead; and Mr. Nicholas K. Wade who alluded to the mechanical necessities of a perfect cremation.[1] This event will, no doubt, be thought of great importance by the friends of cremation. It was not needed to show that a body can be speedily, cheaply, and decently consumed, but it has made the subject more familiar to many people and divested it of some imaginary horrors. As to the question of the advisability of making cremation general or obligatory it stands precisely as it did. We do not believe that there is as yet any necessity for it in this country, and we think that it is open to the serious objection of making the detection of crime more difficult. We commend to the attention of our readers the letter from Dr. Adams which appears in this number.

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MEDICAL NOTES.

— Subscriptions for the forthcoming volume of Transactions of the International Medical Congress are now being received. As but a limited edition will be printed, gentlemen who wish to obtain copies are requested to forward their names, with the amount of subscription ($6 per copy, in advance), to the Treasurer, Dr. Caspar Wister, 1303 Arch St., Philadelphia, before January 15, 1877. The price of the volume will be raised upon the day of publication.

— The *Louisville Medical News* states that in connection with a poisoning case, now before the courts, the *Union médicale du Canada* relates a curious but little-known episode of another celebrated trial, which took place in Belgium some years since. At one time the prisoner, B., could hope to escape conviction, when a casual observation caused his ruin. The government had called as an expert Mr. Stas, Professor of Chemistry at the Polytechnic School of Brussels, who conducted his experiments on the deceased's intestines in a closed room, in presence of a number of persons. "I beg you, gentlemen," said the professor, "not to smoke; the smell of tobacco is unbearable to me!" "Nobody is smoking," answered one of his assistants. The smell, then, emanated from the viscera of the body itself. An idea struck the eminent chemist like lightning. In an instant the re-agent for nicotia was applied, and the alkaloid which had been first detected by the smell was proved to be present. Six weeks later B. was executed at Mons. Had Mr. Stas been a smoker the prisoner would have been saved.

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[1] For many of these facts we are indebted to Dr. Charles F. Folsom, of the State Board of Health, who was present upon the occasion. — Eds.

— Doctors E. B. Gray and H. M. Tuckwell, physicians to the Radcliffe Infirmary, Oxford, report in the *London Lancet* of November 18th that in thirty-eight cases of *chorea* treated without medicine the expectant treatment was at least as successful as the treatment by medicine; and that the average duration of the disease in these cases so treated without medicine was nine weeks and six days, or exactly the average of Sée's one hundred and seventeen cases treated with various medicines. They declare that they are inclined to rely on isolation, a good nurse, a large crib well padded and walled in with pillows, plenty of nutritious food, without stimulants, until more conclusive evidence can be obtained that the disease can in the slightest degree be favorably influenced by any medicines yet discovered.

These observations are in the right direction. When it is known what diseases will do without medication, and not till then, the beneficial effects of drugs, if any, can be ascertained, and the *best treatment* of the sick, the ultimatum of professional science, be more nearly than hitherto approached.

— In some Notes on Surgical Practice among the Natives in Shanghai, by Edward Henderson, M. D., published in the *Edinburgh Medical Journal* for November, 1876, it is stated that in the opinion of the writer the Chinese — or, at least, the class of Chinese treated in hospitals — are, as compared with Europeans, better subjects for surgical operations. With the former the repair of wounds is less frequently hindered by inflammations; they recover from severe injuries with greater certainty and rapidity, and with less constitutional disturbance than Europeans do. These facts are well shown in the case of head injuries, of which the Chinese appear to be peculiarly tolerant; cerebral concussions and contusions, with or without fracture of the skull, are of frequent occurrence among the natives in Shanghai, and many of the recoveries have been little less than wonderful, both as regards their rapidity and apparent completeness. The results of compound fractures also are, as a rule, more favorable among the Chinese than among Europeans. Illustrations of tolerance of injury are also met with in other than strictly surgical practice. A case is reported in which a foreign surgeon was called to visit a native woman who had been in labor four days. When the surgeon saw her, uterine action had ceased, the shoulder of a dead infant presented at the vulva, being unusually firmly impacted in the pelvis along with part of the trunk. Delivery by turning could not have been effected, and it was with difficulty that the surgeon, Dr. Johnston, could reach and divide the neck of the child. The operation occupied much time, and, when completed, the patient's condition was very critical. On the fourth day, however, she had almost completely recovered, and opened the door for the doctor when he came to visit her.

— Dr. J. Besnier, says *The Medical and Surgical Reporter*, has recently concluded the publication, in the *Journal de Thérapeutique*, of a series of articles on Blistering in Pleurisy, which he had previously read as a paper at the Société Médicale d'Emulation. In these he expresses his surprise that while so much discussion has lately taken place at Paris on the operation of paracentesis thoracis, so little has been said about preventing its necessity. This may arise from the operation being principally performed at hospitals, where the patients are not seen until late in the disease; and it has met with little favor in private practice in Paris. For his own part, Dr. Besnier believes that it may almost always be avoided by the employment of blisters, but only on condition of these being applied early, on the first or second day, which may be done safely and advantageously, whatever amount of acuteness of the disease and its accompanying fever be present. If we wait until this subsides, the opportunity is lost, and the means is then of doubtful efficacy.

— Dr. James A. Agnew reports to the *Virginia Medical Monthly* three cases in which he has employed gelseminum as an adjuvant to mechanical means for dilatation of the cervix uteri. The first patient upon whom he tried gelseminum had retroflexion of the uterus. The cervix was small and conical; the os was at the apex of the cone, and was so nearly closed that he could not introduce the smallest laminaria tent. He had two conical bougies made by an ingenious blacksmith — the little end of the smaller bougie being not larger than a knitting needle. Even this small instrument could not be introduced.

While sheathing a bistoury for the purpose of incising the lips of the external os uteri, the influence of gelseminum over sphincteric action occurred to him, and he determined at once to try it. He gave ten drops of the fluid extract of gelseminum every ten minutes until thirty drops had been taken. Immediately after the last dose, without the slightest difficulty, he passed successively the bougies and a No. 1 sponge tent up to the point of flexion. On the fourth day thereafter, he failed in every effort to introduce a No. 2 sponge tent until the fluid extract of gelseminum had been given as before. After this was given, the tent was readily passed up to the point of flexion; and, to his great satisfaction, after a little manipulation, it passed this point, and there was no further trouble in the operation of dilatation. He has tried gelseminum in two other cases, with equal success.

— We learn from *The Medical and Surgical Reporter* that at the meeting of the American Pharmaceutical Association, this fall, it was stated that the total imports of drugs for the fiscal year were four hundred and seventy-six million dollars, while the total exports were five hundred and ninety-six million dollars, leaving a balance in our favor of one hundred and twenty million dollars.

The character of many of the powdered drugs of the market was alluded to, and their quality hinted at by the comparative prices at which they were sold, and the value of good crude drugs. Borax was exported to the extent of three million pounds, while California and Nevada have produced in all during the year six million.

The Pacific Coast has furnished during the year fifty-four thousand flasks of mercury, while less than that has been produced by all the other nations of the world combined. The product of opium was stated to be smaller in amount for the year than was anticipated, and it would probably advance in price still further.

THE SANITARY ASPECT OF CREMATION.

MESSRS. EDITORS, — As the cremation of the body of the late Baron de Palm at Washington, Pa., on the 6th inst., revives to a certain extent the popular interest in cremation, I wish to make known a fact which adds completeness to my paper on Cremation and Burial published in the Sixth Annual Report of the State Board of Health. As the result of my investigations regarding the supposed injurious influence of grave-yards and cemeteries upon the public health, I was able to find only a single case in this country in which sickness could be fairly attributed to a cemetery, and that case I was unable to investigate sufficiently, owing to the removal of my correspondent to another State. A few months after the publication of the report, however, I was able to look into the case more thoroughly, and found that in this, as in all the other suspicious cases which had come under my notice, the cemetery could not be held accountable for the sickness. The case in question was at Lenox, Mass. Dr. Davis had reported that more sickness prevailed in certain houses near the foot of the hill on which the cemetery is located than in any other part of the village. The bottoms of the graves were much higher than the bases of the houses, and the natural drainage of the cemetery was in their direction. He attributed the sickness to poisoned wells.

On personal inquiry and inspection of the premises, I found that the sickness referred to consisted of several (I think three) cases of typhoid fever, which originated in the house nearest to the cemetery, situated about twenty-five yards from the inclosing fence, and on a much lower level, a road passing between. The well from which the family was supplied with water was far in the rear of the house, at the foot of a steep hill, and about one hundred and fifty yards from the cemetery, which was by no means crowded and had no recent graves very near the house in question. The soil was an impervious "hard-pan." The well-water was analyzed by Professor Nichols, of the Institute of Technology, and found to have no trace of contamination, but to be remarkably pure. The cellar of the house was dry, clean, and odorless, the wall well cemented, and there was no sign whatever of any percolation from the cemetery; neither had any odor ever been perceived outside the house. Having failed to trace the cause of the sickness in any way to the cemetery, I was, on the other hand, successful in finding a sufficient and probable cause within the house. On the second floor, connected with the back hall, was a slop-sink, of which the waste-pipe was trapped in the cellar only, and which emitted a decided smell, the only escape for it being through the hall and the rooms opening upon it. All of the persons attacked with fever slept in rooms opening upon this back hall, near the slop-sink, and must have breathed the vitiated air every night. I think it may therefore be said that the cemetery was not responsible for the sickness.

This disposes of the last case on my list in which a cemetery was held under suspicion. My investigations, therefore, have failed to establish a single case in this country of sickness caused by cemeteries, although I sent out nearly five hundred circulars of inquiry, to one hundred and seventy-one of which I received answers. Although others will very likely be successful in bringing to light a few such cases, it must be considered settled that the effects of cemeteries as disease-producing agents are utterly insignificant when compared with the ordinary domiciliary causes of pythogenic diseases.

The over-crowded, pestilential grave-yards upon which the cremationists build their sanitary argument are things of the past, and, both in this country and in Europe, the sanitary laws are sufficient to render them hereafter impossible; cremation, therefore, becomes merely a question of sentiment and convenience, especially in our own sparsely-populated country. It is a process which, if performed at a sufficiently high temperature to render combustion complete and to destroy all noxious gases, is open to no practical objection, except that it might prevent the detection of crime. But this is an objection which can easily be met, and, as the process has, from a sentimental point of view, much to recommend it, it is quite likely to become a not infrequent method for the disposal of the dead. J. F. A. ADAMS, M. D.

PITTSFIELD, MASS., *December* 2, 1876.

LETTER FROM BALTIMORE.

MESSRS. EDITORS, — We gladly seize this opportunity to state a few facts recently reported with reference to the Maryland State Hospital for the Insane. It will readily be seen that the treatment of the inmates of this institution leaves nothing to be desired, and that thus another verification is added to Dr. Bucknill's refutation of certain foreign aspersions upon the treatment of the insane in America in general. Spring Grove Asylum, as it is more familiarly styled, was removed from East Baltimore to the new institution erected by the State near Catonsville a few years ago. Recently it came under the administration of the present board of officers, consisting of President, Professor C. W. Chancellor; Secretary, Professor Thomas R. Brown; Medical Superintendent and Treasurer, I. S. Conrad, M. D.; Assistant Physician, R. J. B. Broome, M. D., who have already accomplished much, and promise more. There are now in the building some four hundred patients; fully fifty per cent. of these pay their expenses, the balance being charity patients. The institution can accommodate many more, and, should the number of non-paying patients increase, the necessary appropriations will not long be wanting from a community noted for its public spirit. The building itself, situated on a fine site, to which fresh breezes from the bay and pure air on all sides have access, is in the form of an *échelon*, with entrance to the east. The extreme quiet as the visitor approaches speaks of order and discipline obtained rather by kindness than by force, the interior having more the air of a home than of a place of confinement.

A wide corridor paved with marble tiles pierces the centre; on the right are the offices and dispensary, and on the left the library, consisting of upwards of seven hundred volumes, given by the late Dr. Fisher. Records are kept of books loaned to patients, such only being allowed as are suited to their condition of mind. The distinction between patients is made entirely from their mental qualities and not from their ability to pay for accommodations, and it were well if this broad and spiritual classification were carried out in all institutions of this kind. It will thus be seen that an indigent patient receives the same kind care and attention, the same table and bed, as those who pay. The peculiarities of patients, as well as their weaknesses, are studied and watched, being indulged or curtailed as the best medical advice may indicate, and suitable amusements and recreation are provided; in short, everything conducive to make them contented and happy. Each wing of the building is divided into nine classes, ranging according to the degrees of insanity. All the rooms are neat, cleanly, and comfortably furnished, and the general sanitary arrangements, including ventilation and drainage, are good. The fire arrangements are better than in any other institution of this kind in the country. Plugs connected with reservoirs and hose are placed throughout the building, and the attendants are thoroughly drilled and ready in case of an alarm.

The patients are quiet, tractable, and well clothed, the clothing furnished by the institution being graded on the same mental basis. The absence of the "strait-jacket" was noticed except in one instance. A couch is ingeniously arranged for patients who refuse to lie down at night. There is a fine lecture-room with a stage in the building, and there is a large garden attached. The sale of plant-slips and flowers during the year is sufficient to cover the gardener's wages as well as all greenhouse expenses. Early vegetables are raised, and the lettuce and celery beds now present a creditable appearance. Those patients who have a *penchant* for agriculture or horticulture are allowed to assist the gardener at his work.

The laundry building is in the rear of the hospital proper, and is superintended by attendants assisted by patients. It is provided with washing-machines, etc., and all the labor done in this and in other departments by inmates is entirely at their option. The apparatus for heating the building is in the laundry, and is of the latest and most approved pattern. In the grounds is an artificial lake, which will furnish fish in summer and ice in winter. A bowling-alley, billiard room, and reading-room are at the disposal of the more docile patients, who play sometimes at chess or cards. Another feature is the weekly hop. The cuisine is well kept up. At eleven P. M. the retiring bell sounds.

We might dilate still further upon this model institution, but enough has been said to show that it is one of many of which America has reason to be proud, and that it will compare favorably with any establishment of its kind in England, in some of the medical journals of which country it is to be regretted that remarks disparaging our institutions have appeared, though they were not countenanced by the Medico-Psychological Association at their annual meeting held at the London College of Physicians July 28th.

G. H. B.

BALTIMORE, *November* 16, 1876.

COMPARATIVE MORTALITY-RATES FOR THE WEEK ENDING DECEMBER 2, 1876.

	Estimated Population, July 1, 1876.	Total Mortality for the Week.	Annual Death-Rate per 1000 for the Week.	Death-Rate for the Year 1875.
New York	1,061,244	427	20.92	29.35
Philadelphia	825,594	317	19.97	22.24
Brooklyn .	506,233	213	2 188	24.92
Chicago . .	420,000	162	20.06	19.75
Boston . .	352,758	136	20.05	26.20
Providence	101,500	33	16.91	19.02
Worcester .	51,087	12	12.21	20.91
Lowell . .	51,639	28	28.19	20.55
Cambridge	49,670	13	13.61	23.31
Fall River	50,372	12	12.39	23.99
Lawrence .	36,240	20	28.69	25.96
Lynn . .	33,548	11	17.05	19.23
Springfield	32,000	2	3.25	20.93
Salem . .	26,344	14	27.41	22.92

Normal Death-Rate, 17 per 1000.

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OBITUARY.

It is with deep regret that we record the death of Jairus Greenwood Bridgham, which occurred at the City Hospital last week. The deceased was one of the house physicians, and had discharged his duties with rare faithfulness and ability. The cause of his death was scarlet fever, which he contracted while at his post. His death removes from the profession one whose future was of unusual promise.

Boston Society for Medical Observation. — A regular meeting of the society will be held on Monday evening next, at eight o'clock, at its rooms, 36 Temple Place.

Dr. Fitz will read a paper on Sudden Death from Embolism.

Books and Pamphlets Received. — Annual Report of the Surgeon-General of the United States Army. 1876.

The Twenty-First Annual Report upon the Births, Marriages, and Deaths in the City of Providence for the Year 1875. By Edwin M. Snow, M. D.

Public Health Reports and Papers (Vol. II.) presented at the Meetings of 1874 and 1875. New York: Hurd and Houghton. 1876. (For sale by H. O. Houghton & Co.)

Atlas of Skin Diseases. By Tilbury Fox. M. D., etc. Parts 6, 7, 8, 9, and 10. Philadelphia: Lindsay and Blakiston. 1876. (For sale by A. Williams & Co.)

Healthy Skin. A Popular Treatise on the Skin and Hair. By Erasmus Wilson, M. D. Eighth Edition. Philadelphia: Lindsay and Blakiston. 1876. (For sale by A. Williams & Co.)

Modern Therapeutics. A Compendium of Recent Formulæ, etc. By George H. Napheys, A. M., M. D. Fourth Edition, re-written and enlarged. Philadelphia: D. G Brinton. 1877.

Transactions of the Colorado State Medical Society. Denver. 1876.

Report of the Board of Health of the City and Port of Philadelphia to the Mayor, for the Year 1875.

A New Method of Treating Hæmorrhage after Abortions and at Full Term. By H. Otis Hyatt, M. D. (Reprinted from the American Journal of Obstetrics and Diseases of Women and Children, October, 1876.)